

TTCGGATCCTGGACCTTCCGGTTCTCTACCCCATTCTGGCCCTTGAGCCCAGGGAGCGAGGGCAGTG
TGGTTAATGGGGAGAGCCATGCATCCGGGACCACCACTCTCACAGACTGCCTGCGAAGATTACCAAGACC
AGAGCACTTAGGAAGCAGTGCCAAGATCAAGTGTAGCGGTTGCCATAGCTACCAAGAGTCCACAAAGCAG
CTCACCATGAAGAAGCTGCCATTGTGCCCTGTTCCATCTCAAACGATTGAACACTCAGCCAAACTTC
GGCGGAAGATCACACATATGTGTCTTTCCCTGGAACGTGACATGACGCCCTCATGGCCTCCAGCAA
AGAGAGCAGGATGAATGGGCAATACCAGCAGCCCCCTGGACAGTCTCAACAATGACAACAAATACTCCCTG
TTTGCTGTCGTTAACCATCAAGGGACCTTGGAGAGTGGCCACTACACCAGCTTCATCCGGCAGC
ACAAAGACCAGTGGTTCAAGTGTGATGACGCCATTATACCAAGGCCAGCATCAAAGATGTACTGGACAG
TGAAGGGTACTACTCTTCTATCACAAACAGTTCTGGATTACGAGTAGCTCCTGCCTGCTGGCCAGAGA
AAGAGAGAGA (SEQ ID NO:1)

FIGURE 1

underlined = deleted in targeting construct

[] = sequence flanking Neo insert in targeting construct

TTCGGATCCTGGACCTTCCGGTTCTTCTACCCCATCTGGCCCTTGAGGCCAGGGAGC
GAGGGCAGTGTGGTTAATGGGGAGAGCCATGCATCCGGGACCACCACTCTCACAGACTGC
CTGCGAAG [ATTTACCAAGACCAAGCAGCTCACCATGAAGAAGCTGCCATTGTGCC
TGCCATAGC] **TACCAAGAGTCCACAAAGCAGCTCACCATGAAGAAGCTGCCATTGTGCC**
TGTTTCCATCTCAAACGATTTGAACACTCAGCAAACCTCGGCCAGATCACCAACAT
GTGTCTTCCCCTGGAACCTGGACA [TGACGCCCTCATGGCCTCCAG] CAAAGAGAGCAGG
ATGAATGGGCAATACCAGCAGCCCTGGACAGTCTCAACAATGACAACAAATACTCCCTG
TTTGCTGCTGTTAACCATCAAGGGACCTGGAGAGTGGCCACTACACCAGCTCATCCGG
CAGCACAAGACCAAGCAGTGGTCAAGTGTGATGACGCCATTATCACCAAGGCCAGCATCAA
GATGTACTGGACAGTGAAGGGTACTACTCTTCTATCACAAACAGTTCTGGATTACGAGT
AGCTCCTGCCCTGCTGCCAGAGAAAGAGAGA

Gene Sequence
Structure *

190 bp

Sequence Deleted

325 bp

Size of EST
contig: 634 bp

FIGURE 2A

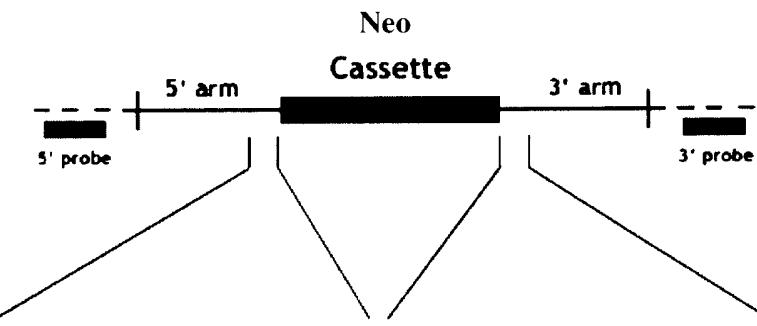
Targeting Vector* (genomic sequence)

Construct Number: 2869

Arm Length:

5': 0.4 kb

3': 3.5 kb



— Targeting Vector
- - - - Endogenous Locus

* Not drawn to scale

5' > AGATGACACCTTAACCTACTG
GTGAACCTTGAGTGATAAAATAAT
CTGTTCCCTTCTTCCATGTCCCT
CATGTCTTTACTTTCCCTTTC
CATGTTTATTTTTAATAAAAAC
ACGTTTTAAATGCCCTTGTAGAT
'TTACCAAGACCAGAGCACTTAGGAA
GCAGTGCCAAAGATCAAGTGTAGCG
GTTGCCATATC<3' (SEQ ID
NO:2)

5' > TGACGCCCTTCATGGCCCTCCA
GGTAGAAAGGGTTGGTGTGCTCCTGT
GTCTGAGTGGGAAGGCAAGTTGTC
'TAGTGGGTGCTTACCCAGTGCCAG
CCCTTAGACATGGTAATGACAGCT
ATCCAGGGCTCACCGGCCACCCAG
AACTTACCTAAGCTACTGTGGC
TACCCATTGTACTCTTAACATCC
CTCATCATTTA<3' (SEQ ID
NO:3)

FIGURE 2B